Before the

**Federal Communications Commission**

Washington, D.C. 20554

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| In the matter of | ) | |
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| Advanced Television Systems | ) | MM Docket No. 87-268 |
| and Their Impact upon the Existing | ) | |
| Television Broadcast Service | ) | |
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# REPLY COMMENTS OF THE ASSOCIATION OF LOCAL TELEVISION STATIONS

**Association of Local Television Stations, Inc.**
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To the Commission:

## REPLY COMMENTS OF THE ASSOCIATION OF LOCAL TELEVISION STATIONS

After nearly a decade of intense work, the broadcast industry is ready, willing an able to move forward and deploy advanced digital television. Critical to this deployment is the creation and adoption of a table of allotments and assignments.

For several years the Broadcasters' Caucus, together with MSTV, has been developing a proposed table of allotments and channel assignments. ALTV has supported and continues to support this process. Indeed, there is a broad consensus among the various segments of a highly competitive local television industry. The entire industry agrees that we must move forward and deploy free, over-the-air digital television as rapidly as possible.

Recently, however, an issue has arisen regarding the relative disparity in power levels assigned to DTV stations in a large number of markets. This concern applies to both in the FCC proposed table as well as MSTV's proposed modified table. After considerable discussion, the broadcast industry reached a consensus on how to address this issue. The solution is contained in the Reply Comments filed by the Broadcaster's Caucus. ALTV is a signatory to those Reply Comments. We support the compromise position, but write separately to address one specific issue in the compromise -- interim power levels for UHF DTV stations that attempt to replicate the coverage areas of analog VHF stations.

**The Issue: Replication**

From the beginning the broadcaster's have been trying to replicate the existing patterns of analog service in the DTV world and, where possible without causing additional interference, maximize service to the public. These are sound basic principles. Nonetheless, the concept of replicating analog geographic coverage areas in the DTV world appears to have lead to some unforseen consequences.

Because of the VHF band's superior propagation characteristics, existing VHF analog stations are able to serve a very large geographic area, including service beyond the horizon, without employing massive amounts of power. On the other hand stations operating in the UHF band have generally smaller service areas because of the massive amounts of power necessary to transmit a signal. Accordingly, VHF analog stations that have been matched with a UHF DTV channels (VHF/UHF) need massive amounts of power to replicate the coverage area of the

existing analog VHF station. Alternatively, UHF analog stations that have been matched with a UHF DTV (UHF/UHF) channel will need significantly less power to replicate their geographic coverage areas. Unfortunately the power disparity which arises out of this situation is very significant. In some instances VHF/ UHF DTV stations have been assigned power levels that are 10, 20 and even 100 times more than their UHF/ UHF DTV counterparts. For example, in Baltimore one UHF/UHF station was assigned a proposed DTV power level of approximately 27 kilowatts. This station must compete against VHF/UHF stations broadcasting 2.7 megawatts (27 00 kilowatts.)

The primary concern is that the UHF/UHF DTV channels have been assigned such low power levels that they may not be able to provide a sufficient signal within their Grade A contour. Specifically, can the DTV signal of a UHF/UHF station be received by indoor receiving equipment (indoor antennas) while operating at such low power levels? Unfortunately, we believe an insufficient amount of data has been collected on this issue. Obviously, if the assigned power levels are insufficient, the competitive posture of the UHF/UHF DTV stations will be radically altered.

While ALTV has supported the concept of replicating geographic service areas, we do not believe that UHF/UHF stations should be made worse off in the highly competitive DTV world. To the contrary , the benefits of DTV were supposed to eliminate many of the handicaps that UHF stations now endure in the analog world. At the very least, the relative competitive position between analog UHF and VHF stations should be maintained, if not improved.

**Broadcasting Industry's Solution**

The Broadcaters' Caucus Reply Comments contain a carefully crafted solution to this problem. Central to the solution is that the concept of replication should encompass more than replicating geographic coverage. Replication should include additional elements. Indeed broadcasters have agreed to conduct additional field tests.

> Such test should evaluate the extent to which the relative competitive posture of today's UHF and VHF stations is replicated in the DTV environment both with respect to Grade A and Grade B coverage and taking into account indoor direct connected antenna and reliability of reception.[1]

All agree that additional tests should be conducted over an 18 month period. All agree that if problems arise the FCC should adopt appropriate solutions to correct the problems. All agree that at least 700 UHF/UHF stations located primarily in medium and small markets can increase their power. All agree that, subject to certain limitations, UHF/UHF stations should be able to double their assigned power levels during the 18 month testing period.

The only disagreement is the whether the power levels assigned to VHF/UHF DTV stations should limited during the 18 month testing period. Even on this issue, all agree to some form of cap, save for a yet to be determined number of experimental stations. Some broadcasters argue that these stations should be permitted to broadcast at 1 megawatt (1000 kilowatts). ALTV an others believe VHF/UHF stations should be limited to 500 kilowatts during the period.

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[1]Broadcasters' Caucus Reply Comments at 14.

To the extent we are not entirely sure whether the UHF/UHF power levels will be sufficient to replicate coverage with respect to indoor antennas, prudence dictates that we not assign power levels that may have to be adjusted downward. For the 18 month testing period, a 500 kilowatt standard (with appropriate exceptions for experimental stations) is reasonable. This interim standard is superior to the 1 megawatt approach.

First, as the FCC knows, it is difficult to "unscramble" an egg. Once stations are operating at certain power levels it often difficult, as a practical matter, to get stations to reduce power. Nonetheless, some reductions may be necessary once the test results come in. While most of the UHF/UHF DTV interference appears to be with existing NTSC/UHF stations, the DTV to DTV interference is not *de minimus*. Accordingly, keeping power levels at 500 kilowatts will avoid having to "power down" some stations. Second, because we do not know for certain whether the assigned UHF/UHF power levels will be sufficient for indoor reception, we need to attempt to replicate the existing competitive climate during the testing period. If the lower UHF/UHF power levels do not permit indoor reception, permitting a competing VHF/UHF station to operate at 1 megawatt, would create a significant competitive imbalance over the 18 month period. Finally, it must be remembered that the proposed 500 kilowatt power limitation on VHF/UHF power is only for the initial 18 month testing period. Stations would be able to increase to maximum power after this testing period, subject of course to any future FCC action resulting from the studies.

**Implications and Cause For Concern**
**Channels 60 -69**

The UHF/UHF power issue raised in these Reply Comments has significant implications for the FCC's plan to place most of the DTV stations between channels 7 to 51. Specifically, the FCC's plan to conduct early auctions on "vacant" channels 60 - 69 could spell disaster for many UHF stations.

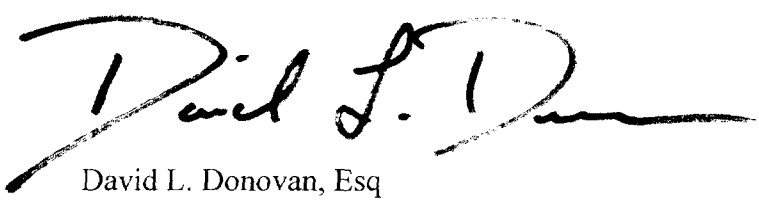
One of the key issues in this debate is whether UHF/UHF stations have been assigned sufficient power to replicate their coverage area, including indoor television reception. If the assigned power levels are insufficient, the FCC will have to make adjustments to remedy the situation. These adjustments could include permitting increased power, directional antennas and other engineering techniques. All of these solutions could result in additional interference to existing NTSC UHF stations. As a result, there may be instances where a UHF/UHF DTV station cannot increase its power. The only alternative may be to assign it a "vacant" UHF channel. Unfortunately, an early auction of these channels will limit the FCC's ability to make these critical adjustments. The key point is that we simply do not know what additional channels will be needed, if any, to solve these power problems. We will only have the answers after the 18 month testing period. Accordingly, the FCC should not bias its table towards core channels and in no instance should it agree to reallocate or auction channels 60 to 69 until these UHF/UHF power issues are resolved.

## Conclusion

ALTV believes the time has come to move forward now with the table of allotments and assignments as contained in the Broadcasters' Caucus Reply Comments. We do so with the understanding that, pursuant to the compromise contained in those comments, the concerns about UHF power levels and replication will be addressed. The 18 month testing period will be critical and advance our understanding of the problems surrounding UHF/UHF power levels. Most importantly, however, the FCC should not view compromise and "real world" testing as an excuse to slow down the allotment and assignment process. To the contrary, it demonstrates the broadcasting industry's commitment to develop a working system that will benefit all Americans.

Respectfully Submitted

**ASSOCIATION OF LOCAL TELEVISION STATIONS**



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